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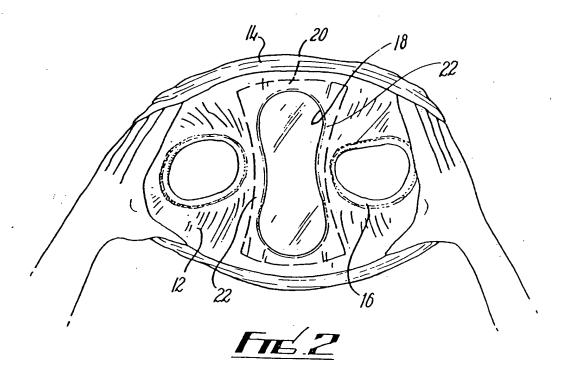
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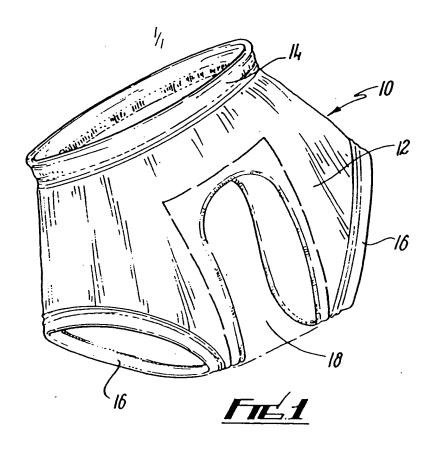
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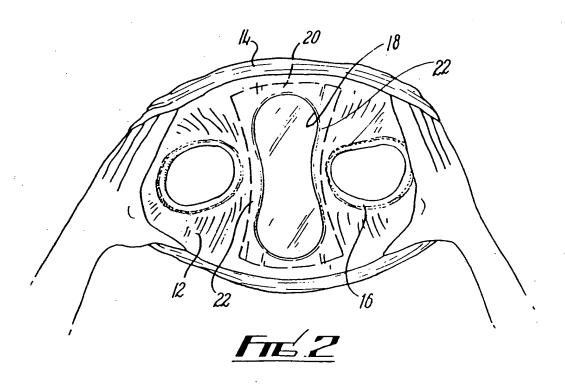
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- (56) Documents cited GB 2174289 A GB 2174288 A GB 1580550 A GB 1342022 A GB 0878455 A GB 0679754 A GB 0636730 A GB 0467760 A US 4280230 A
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## (54) Incontinence pants

(57) A pair of pants has means for retaining an absorbant. The pants may have an opening (18) in the crotch area of a shape to bound all of a person's lower bodily openings. A cover (20) of a waterproof material is provided on the outside of the pants to cover the opening (18) and is in the form of an open-ended sleeve wherein the absorbant can be inserted and retained so as to be exposed internally of the pants. Alternatively, an opening (18) is not provided and an additional piece of material is provided internally of the pants in the crotch area and has an opening therein bounding all lower bodily openings and receiving the absorbant. When the pad is soiled, the body material of the pants need not become soiled and thus only the absorbant will require changing, with the pants being re-used.







## Incontinence Garments

This invention is concerned with improvements in or relating to incontinence garments.

According to the present invention there is provided an incontinence garment in the form of pants having leg holes, an opening in the material of the pants being formed between the leg holes, and means being provided for removably retaining an absorbant material across said opening.

The opening is preferably of a shape and size to, in use, cover all of a person's lower bodily openings irrespective of their sex. The opening preferably has a generally rectangular configuration with a longer dimension of at least 200mm and a shorter dimension of at least 100mm. The pants preferably have a configuration to be usable with a conventional size absorbant pad.

Preferably also the pad retaining means comprises a waterproof cover. The pad and the cover may overlie an area greater than the opening and the cover may be formed of a waterproof material such as polyurethane coated nylon.

The pad is preferably held in position by an overlap of material of the pants formed around the opening, the

overlap being desirably elasticated. The cover may be in the form of an open-ended sleeve wherein the pad can be inserted.

An embodiment of the present invention will now be described by way of example only with reference to the accompanying drawings, in which :-

fig. 1 is a front external view of a pair of partially
incomplete; and

Fig. 2 is an internal view of the pair of pants.

The drawings show a pair of incontinence pants 10 of a conventional shape having a body 12 with an elasticated waistband 14 and leg holes 16. The body 12 may be made for example from polyester which absorbs less urine that other materials. An opening 18 is provided in the crotch area of the body 12, and is of a shape to cover, in use, all of a person's lower bodily openings. Research has shown that it is preferable for the opening 18 to be substantially rectangular, and substantially 110mm wide and 240mm long, this enabling the pants 10 to be suitable for both males and females.

A cover 20 of a waterproof material (Fig. 3), for example polyurethane coated nylon, is provided on the out-

is substantially rectangular and has a greater longitudinal dimension than the opening 18. The cover 20 is stitched along its side edges to the body 12, and the edges of the cover 20 are spaced from the sides of the opening 18 to provide an overlap 22 of body material along the sides thereof. An elasticated band is provided in the body material around the edge of the opening, being in the overlap 22 of material at the sides of the opening 18.

The end of the cover 20 at the rear of the pants 10 is sewn to the body 12 across its end to provide a closed sleeve. At the front of the pants 10 the end of the cover 20 is open thus forming an open sleeve.

In use, an absorbant pad (not shown), is inserted at the front end of the pants 10 in the open sleeve and is slid along the length of the cover to the closed rear end. The pad is held in position at each end of the cover 20 between the cover 20 and the body 12, and over the opening 18 by the cover 20 and the elasticated overlap 22 of material. The pad may be of a standard size and may comprise wood pulp in a cellulose sleeve.

In a further embodiment (not shown), a pair of pants is formed without an opening in the material of the crotch

area of the body itself, but an additional piece of material is provided on the inside of the pants to extend substantially over the crotch area. The additional piece of material is stitched to respective side edges of the body material defining the crotch area, and at each end the additional piece of material is sewn onto the body.

The additional piece of material has an opening of a suitable shape to cover, in use, all of a person's lower bodily openings. An elasticated band is provided in the additional piece of material around the edge of the opening therein, there being an overlap of material in the additional piece at the sides and ends of the opening.

In use, an absorbant pad is inserted through the opening and is of a dimension larger than the area of the opening to be held at each end and at the sides between the additional piece of material and the body, whereby the pad is presented in the opening. As before, the pad may comprise wood pulp in a cellular sleeve.

The above examples thus describe incontinence pants each with a number of advantageous features. The provision of the exposed absorbant pad at the opening is such that, when the pad is soiled, the body material of the pants need not become soiled, and thus only the pad will require

changing. The pad can be easily changed and the pants then worn again with a fresh pad. The elasticated lip around the opening helps retain the pad in position during use. The pants are unisex and are of a simple design and thus can be inexpensively manufactured. Re-use of the pants provides considerable savings in cost.

Various modifications may be made without departing from the scope of the invention. For example the pants may be made a different size or of different materials. The opening may be a different shape or size.

## Claims :-

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- 1. An incontinence garment in the form of pants having leg hole's, and means for removably retaining an absorbant material between the leg holes, means being provided whereby the absorbant material can be exposed internally of the garment.
- 2. A garment according to Claim 1, wherein the exposing means comprises an opening provided in the material of the pants and the retaining means comprises a cover extending externally across the opening.
- 3. A garment according to Claim 2, wherein the cover is formed of a waterproof material.
- 4. A garment according to Claim 3, wherein the waterproof material is polyurethane coated nylon.
- 5. A garment according to any of Claims 2 to 4, wherein the absorbant material and the cover overlie an area greater than the area of the opening.
- 6. A garment according to any of Claims 2 to 5, wherein the cover is in the form of an open-ended sleeve wherein the absorbant material can be inserted.

- 7. A garment according to Claim 1, wherein the retaining means comprises an additional piece of material which is provided internally of the pants, and the exposing means comprises an opening in the additional piece of material.
- 8. A garment according to Claim 7, wherein the additional piece of material is connected along each side to the edge of the respective leg hole and is secured at each end to the material of the pants.
- 9. A garment according to Claim 1, wherein the opening is of a shape and size to, in use, cover all of a person's lower bodily openings irrespective of their sex.
- 10. A garment according to any of Claims 2 to 8, wherein the opening is of a shape and size to, in use, cover all of a person's lower bodily openings irrespective of their sex.
- 11. A garment according to Claim 9 or 10, wherein the opening has a generally rectangular configuration with a longer dimension of at least 200mm and a shorter dimension of at least 100mm.
- 12. A garment according to any of the preceding Claims, wherein the absorbant material is in the form of a conventional size absorbant pad which is held in position by an

overlap of material formed around the exposing means.

- 13. A garment according to Claim 12, wherein the overlap is elasticated.
- 14. An incontinence garment substantially as hereinbefore described with reference to the accompanying drawings.
- 15. Any novel subject matter or combination including novel subject matter herein disclosed in the foregoing Specification or Claims and/or shown in the drawings, whether or not within the scope of or relating to the same invention as any of the preceding Claims.